

Abstract (in conjunction with the only figure)

A process for the low-wear micromachining of workpieces made from metal or metal alloys, in particular steel, in which a workpiece (1) is micromachined using at least one machining apparatus (5) that has a diamond tool (6), in particular an ultraprecision turning, milling or grinding machine, and prior to the micromachining the workpiece (1), in a first step, is subjected to a thermochemical surface zone treatment, and that in a second step the thermochemically treated surface zone (2) of the workpiece (1) is machined using the machining apparatus (5).